6DE6

6DE6

SHARP-CUTOFF PENTODE

7-PIN MINIATURE TYPE

GENERAL DATA

Electrical:

Heater, for Unipotential Cathode:

Voltage	6.3 ± 10%	volts
Current	0.3	amp

Direct Interelectrode Capacitances:

	Without External Shield	*With External Shield*°	
Grid No.1 to plate	0.025 max.	0.015 max.	μμf
Grid No.1 to cathode, grid No.3 & internal shield, grid No.2, and heater	6.5	6.5	μμf
Plate to cathode, grid No.3 & internal shield, grid No.2, and heater	2	3	μμf

Characteristics, Class A_1 Amplifier:

Plate Supply Voltage	125	volts
Grid No.3	♦	
Grid-No.2 Supply Voltage	125	volts
Cathode Resistor	56	ohms
Plate Resistance (Approx.)	0.25	megohm
Transconductance	8000	μmhos
Plate Current	15.5	ma
Grid-No.2 Current	4.2	ma
Grid-No.1 Voltage (Approx.) for plate μa = 20	-9	volts
Grid-No.1 Voltage (Approx.) for transconductance (μmhos) = 700 and cathode resistor (ohms) = 0	-5.5	volts

Mechanical:

Operating Position	Any
Maximum Overall Length	2-1/8"
Maximum Seated Length	1-7/8"
Length, Base Seat to Bulb Top (Excluding tip)	1-1/2" ± 3/32"
Diameter	0.650" to 0.750"
Dimensional Outline	*See General Section*
Bulb	T5-1/2
Base	Small-Button Miniature 7-Pin (JEDEC No.E7-1)

← Indicates a change.

ELECTRON TUBE DIVISION
RADIO CORPORATION OF AMERICA, HARRISON, NEW JERSEY

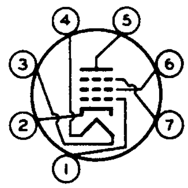
6DE6

6DE6

SHARP-CUTOFF PENTODE

Basing Designation for BOTTOM VIEW 7CM

Pin 1 - Grid No.1
Pin 2 - Cathode
Pin 3 - Heater
Pin 4 - Heater
Pin 5 - Plate



Pin 6 - Grid No.2
Pin 7 - Grid No.3, Internal Shield

AMPLIFIER — Class A1

→ **Maximum Ratings,** *Design-Maximum Values:*

PLATE VOLTAGE.	330	max.	volts
GRID-No.3 (SUPPRESSOR-GRID) VOLTAGE. . . .	0	max.	volts
GRID-No.2 (SCREEN-GRID) SUPPLY VOLTAGE . .	330	max.	volts
GRID-No.2 VOLTAGE. . . . . *See Grid-No.2 Input Rating Chart at front of Receiving Tube Section*			
GRID-No.1 (CONTROL-GRID) VOLTAGE:			
Positive-bias value.	0	max.	volts
GRID-No.2 INPUT:			
For grid-No.2 voltages up to 165 volts	0.55	max.	watt
For grid-No.2 voltages between 165 and 330 volts. . . . . *See Grid-No.2 Input Rating Chart at front of Receiving Tube Section*			
PLATE DISSIPATION.	2.3	max.	watts
PEAK HEATER-CATHODE VOLTAGE:			
Heater negative with respect to cathode	200	max.	volts
Heater positive with respect to cathode	200▲	max.	volts

Maximum Circuit Values:

Grid-No.1-Circuit Resistance:			
For fixed-bias operation	0.25	max.	megohm
For cathode-bias operation	1	max.	megohm

° With external shield JEDEC No.316 connected to cathode.
♦ Connected to cathode at socket.
▲ The dc component must not exceed 100 volts.

→ Indicates a change.

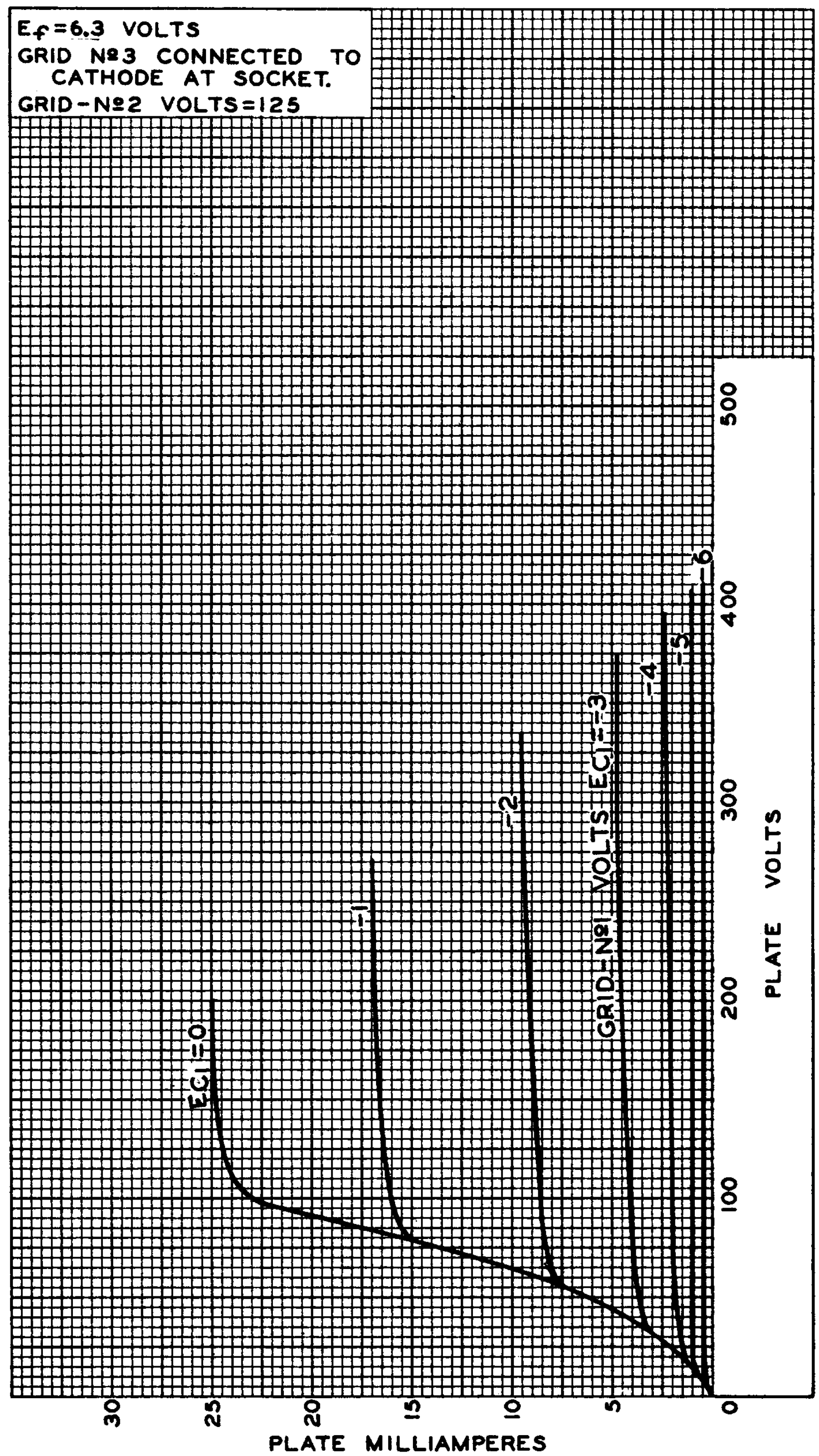
ELECTRON TUBE DIVISION
RADIO CORPORATION OF AMERICA, HARRISON, NEW JERSEY

RCA

6DE6

6DE6

AVERAGE PLATE CHARACTERISTICS



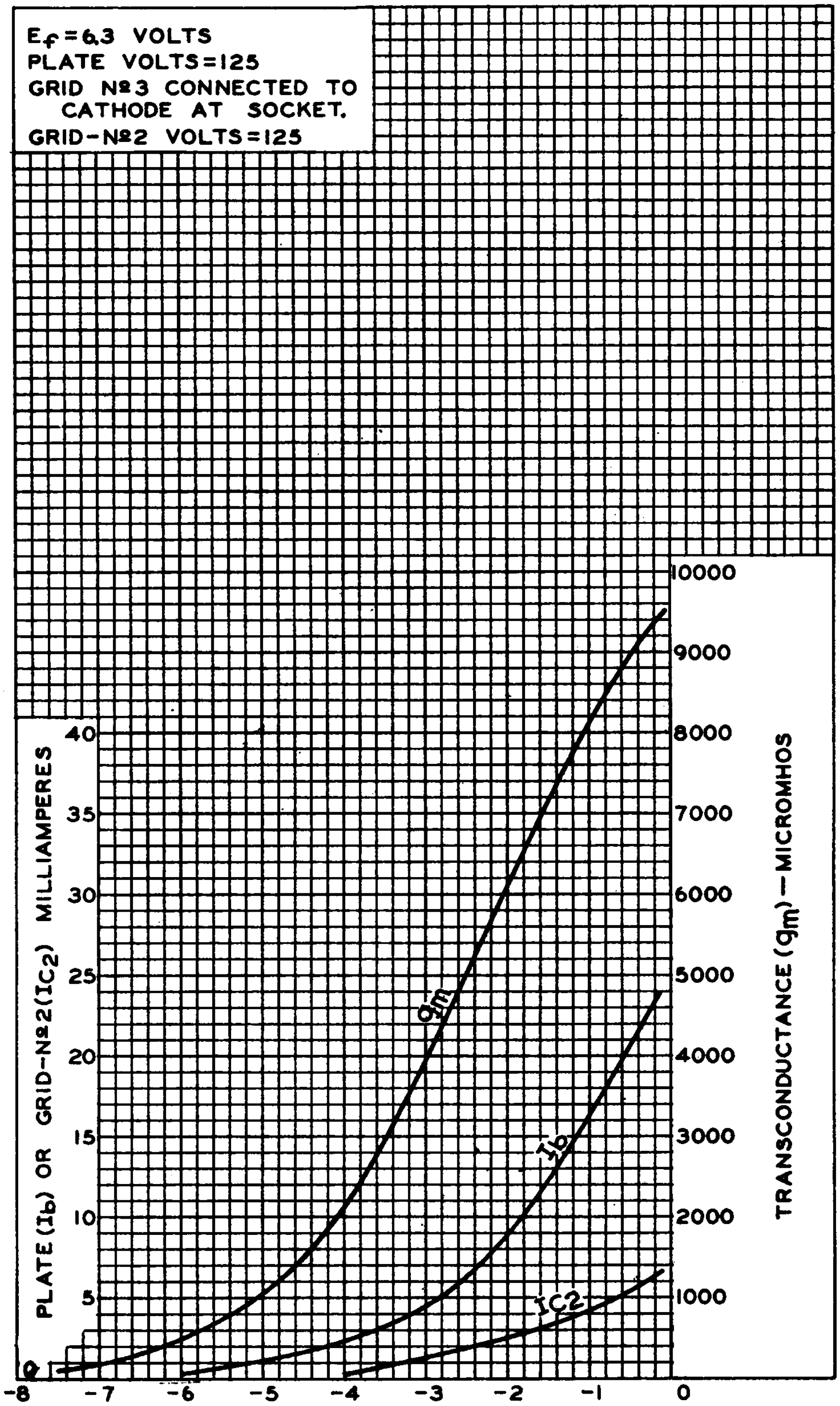
ELECTRON TUBE DIVISION 92CM-8578R1

RADIO CORPORATION OF AMERICA, HARRISON, NEW JERSEY

6DE6

6DE6

AVERAGE CHARACTERISTICS



ELECTRON TUBE DIVISION

RADIO CORPORATION OF AMERICA, HARRISON, NEW JERSEY

92CM-8575R1